

**COMMITTEE ON SCIENCE
U.S. HOUSE OF REPRESENTATIVES**

HEARING CHARTER

H.R. 2692, the U.S. Fire Administration Reauthorization Act of 2003

Thursday, July 17, 2003

9:30 a.m. – 12:00 p.m.

2318 Rayburn House Office Building

1. PURPOSE

On Thursday, July 17th, 2003, the Research Subcommittee of the House Science Committee will hold a hearing to examine U.S. Fire Administration (USFA) programs and activities and H.R. 2692, the U.S. Fire Administration Authorization Act of 2003. The USFA, housed within the Federal Emergency Management Agency (FEMA) and located in Emmitsburg, Maryland, is charged with helping to prevent and limit fire-related losses. Its activities revolve around four primary areas: training, public education, research, and data collection and analysis. On March 1, 2003, USFA and FEMA officially became part of the Emergency Preparedness and Response Directorate of the Department of Homeland Security (DHS).

2. WITNESSES

Panel I

The Honorable Dave Camp is the Representative of the 4th Congressional District of Michigan. First elected to Congress in 1990, Mr. Camp sits on the Ways and Means Committee and the Homeland Security Committee, where he chairs the Subcommittee of Infrastructure and Border Security.

Panel II

Mr. David Paulison is the U.S. Fire Administrator and Director of the Preparedness Division of the Emergency Preparedness & Response Directorate/FEMA in the Department of Homeland Security. Prior to his appointment as U.S. Fire Administrator in December 2001, he was chief of the Miami-Dade Fire Rescue Department. Administrator Paulison has 30 years of fire rescue experience and was selected as Florida's fire chief of the year in 1993.

Dr. Arden Bement is Director of the National Institute of Standards and Technology, a position he has held since December 2001. Before receiving this appointment, Bement served as the David A. Ross Distinguished Professor of Nuclear Engineering and head of the School of Nuclear Engineering at Purdue University. From 1989 to 1995, Dr. Bement was a member of the U.S. National Science Board, the governing board for the National Science Foundation. He is also a member of the U.S. National Academy of Engineering.

Panel III

Mr. Dennis Compton is the immediate past Chair of the Board for the International Fire Service Training Association. Chief Compton has served for over 32 years in the fire service—27 years with the Phoenix Fire Department and five years as the Mesa Chief. He was selected as a charter member of the Arizona Fire Service Hall of Fame and recently received the Congressional Fire Services Institute (CFSI) 2003 Mason Lankford National Fire Service Leadership Award.

Dr. John Hall is Assistant Vice-President for Fire Analysis and Research at the National Fire Protection Association (NFPA). This division at NFPA is responsible for the measurement of the national fire problem and the communication of the results as a statistical basis for fire protection strategies. Dr. Hall was formerly an Operations Research Analyst with the U.S. Fire Administration. He holds a B.A. in Mathematics from Brown University and a Ph.D. in Operations Research from the University of Pennsylvania.

3. OVERARCHING QUESTIONS

The hearing will address the following overarching questions:

1. What is the status of traditional USFA activities, such as public education and outreach, fire research and data analysis, and emergency responder training programs? Does H.R. 2692 adequately address issues relevant to these programs?
2. What is the status of the USFA Assistance to Firefighters Grant Program, and should Congress modify the program in H.R. 2692?
3. What is the need for development of testing methodologies and standards for new firefighting technologies, and what are the pros and cons of H.R. 545, the Firefighting Research and Coordination Act?
4. What is the status of USFA-supported fire research programs? How is USFA's relatively small research budget being leveraged and coordinated with related efforts at the National Institute of Standards and Technology and the Department of Homeland Security's Science and Technology Directorate?

4. BACKGROUND

- In the early 1970's, a report by the President's National Commission on Fire Prevention and Control entitled *America Burning* presented a dismal assessment of fire safety in the United States. The report found that nearly 12,000 citizens and 250 firefighters were lost to fire annually, in addition to approximately 300,000 injuries.
- In response to the report, Congress created the USFA and the National Fire Academy. The USFA, housed within the Federal Emergency Management Agency (FEMA) and located in Emmitsburg, Maryland, is charged with helping to prevent and control fire-related losses. Its activities revolve around four primary areas: training, public education, research, and data collection and analysis.
- When the USFA was established in 1974, its goal was to reduce by half the number of fire-related fatalities in the nation—bringing the number to approximately 6,000 or less per year within a generation. The agency met this goal, and by 1998 civilian fire deaths were at their

lowest level. Additionally, using nearly any measure—number of fires, deaths, injuries, or property losses—the statistics also reflect a declining trend.

- Despite this significant progress, the United States still has one of the worst fire safety records in the industrialized world. The per capita death rate remains two to three times that of several European nations and at least 20 percent higher than most developed countries. Fire remains the cause of approximately 3,700 deaths and \$11 billion in economic damages each year, and every 18 seconds a fire department responds to a call somewhere in the United States.

USFA Organization and Programs

USFA's mission is to provide leadership, coordination, and support for the nation's fire prevention and control, fire training and education, and emergency medical services activities, particularly for America's 26,350 fire departments. USFA's five-year operational objectives, established in 2000, aim to reduce the loss of life from fire in the United States by 15 percent, through targeted reductions of 25 percent for high-risk populations: children 14 years and below, adults 65 years and above, and firefighters.

USFA programs include the following:

Assistance to Firefighters Grant Program — Established in FY 2001, this program awards grants directly to fire departments to supplement basic needs (described in more detail below).

Data Collection — USFA's National Fire Data Center (NFDC) administers a national system for collecting, analyzing and disseminating data and information on fire and other emergency incidents to State and local governments and the fire community. The NFDC provides a national analysis of the fire problem, identifying problem areas for which prevention and mitigation strategies are needed.

Public Education and Awareness — Through partnerships and special initiatives, USFA involves the fire service, the media, other federal agencies and safety interest groups in the development and delivery of fire safety awareness and education programs. These programs are targeted at those groups most vulnerable to the hazards of fire, including the young, elderly, and disabled. For example, USFA recently announced the development of an aggressive plan to advocate increased use of residential fire sprinklers, which have become significantly more effective and less costly due to new technology, but remain utilized in only a very small percentage of homes.

Training — USFA's National Fire Academy offers educational opportunities for the advanced professional development of mid-level and senior fire and emergency medical service officers and allied professionals involved in fire prevention and life safety activities. The Academy develops and delivers educational and training programs with a national focus that is aimed at supplementing and supporting State and local fire service training. In 2002, the Academy trained almost 8,000 firefighters in various courses at Academy headquarters in Emmitsburg, 86,000 firefighters through off-campus training programs (primarily administered through support of state training programs), and 195,000 through its distance-learning program. It is estimated that NFA has trained over 1.4 million students through on-campus and off-campus training programs since its establishment in 1975.

In 2003, an organizational change within FEMA as part of the agency's transfer into the Department of Homeland Security resulted in the transfer of FEMA's Emergency Management

Institute (EMI) into USFA. Through a combination of on-campus, off-campus, and distance learning courses similar to those at NFA, EMI serves as the focal point for the development and delivery of emergency incident management training. Together, EMI and NFA now comprise USFA's National Emergency Training Center (NETC), also headquartered in Emmitsburg, Maryland.

Research — Through research, testing and evaluation, USFA works with public and private entities to promote and improve fire and life safety. For fiscal year (FY) 2003, USFA research activities were authorized at \$3.5 million. These activities are administered in cooperation with the Building and Fire Research Laboratory (BFRL) at the National Institutes of Standards and Technology (NIST). For example, USFA-NIST cooperative research focusing on residential fire protection technologies successfully resulted in the development and enhancement of national consensus standards for sprinkler applications for residential occupancies-where most of fire deaths occur.

The current USFA authorization legislation (P.L. 106-503) directed USFA to work with NIST, private organizations, and State and local government to develop a prioritized research agenda for the agency. The agenda, completed in 2001, identified as top priorities research projects that focus on improving the safety of high-risk populations such as children, senior citizens, and firefighters, reflecting USFA's agency-wide fire safety goals.

Budget — The President's FY 2004 budget request for USFA "base" activities (those except for the Assistance to Firefighters Grant Program, which is authorized through FY 2004), is \$61.0 million, a 49 percent increase above the FY 2003 request. This increase is in part due to the transfer of EMI into USFA as part of FEMA reorganization. USFA has not yet provided Congress written information detailing the FY 2004 request or FY 2003 current appropriations plan. Agency activities are currently authorized at \$50 million for FY 2003.

Assistance to Firefighters Grant Program

The Assistance to Firefighters Grant Program (Also known as the FIRE Act Grant Program) at USFA was established by Congress to provide, through competitively awarded matching grants, direct financial assistance to local fire departments for basic equipment and training needs. For the FY 2003 grant program, Congress appropriated, and President Bush signed into law, \$745 million for the grant program. To ensure USFA has adequate time to distribute the funding effectively, Congress allowed the agency until the end of FY 2004 to obligate all of the funds.

In FY 2003, fire departments were eligible to apply for grants in one of four program areas:

1. **Fire Operations and Firefighter Safety.** Eligible activities under this function are limited to training, wellness and fitness, firefighting equipment, personal protective equipment, and modifications to fire stations and facilities.
2. **Fire Prevention.** Eligible activities under this function include, but are not limited to, public education and awareness activities, fire codes enforcement activities, fire inspector certifications, purchase and installation of smoke alarms and fire suppression systems, wildland mitigation, and arson prevention and detection activities.
3. **Emergency Medical Services.** Eligible activities under this function for fire-based EMS units are limited to equipment, training, and wellness and fitness initiatives. Vehicles, such as ambulances, are not eligible in this programmatic area.
4. **Firefighting Vehicles Acquisition.** Eligible apparatus under this program include, but are not limited to, pumps, brush trucks, tankers, rescue, ambulances, quints (advanced fire

trucks with space for extra personnel and equipment), aerials, foam units, and fireboats. You may apply for only one vehicle per year.

USFA received 19,949 applications for over \$2 billion in federal funding, and began awarding grants in June. As of July 11, 2003, USFA had announced 800 awards totaling \$48 million. By September of 2004, USFA plans to have obligated the full \$745 million through grants to approximately 7,000 fire departments.

In the FY 2004 budget request, the Administration proposed transferring the Assistance to Firefighters grant program to the Office of Domestic Preparedness within the Department of Homeland Security, to be funded at \$500 million. The proposed transfer is part of the Administration's effort to consolidate the counterterrorism programs for emergency responders. While supportive of the first responder program, many in the fire services community have expressed concern about the transfer of the Assistance to Firefighters Grant Program out of USFA, arguing the proposal may result in a shift in program focus toward specialized equipment and training when many fire departments still lack the minimum tools and resources necessary for day-to-day emergency response.

On June 24, 2003, the House approved the FY 2004 spending bill for the Department of Homeland Security (DHS), providing \$750 million for the Assistance to Firefighters Grant Program and explicitly directing that the funds be administered from the Emergency Preparedness and Response Directorate. On July 10, the Senate Appropriations Committee approved its version of the bill, also providing \$750 million for the program, but placing it within the Border and Transportation Security Directorate per the Administration's request.

H.R. 2692, the United States Fire Administration Authorization Act of 2003

H.R. 2692, introduced on July 10, 2003 by representatives Smith (MI) and Johnson (TX), authorizes appropriations for "base activities" (those excluding the Assistance to Firefighters Grant Program, which is authorized through FY 2004) at the Fire Administration of \$61.0, \$62.83, and \$65 million annually for fiscal years FY 2004 through FY 2006, respectively. These amounts reflect the FY 2004 budget request, with approximately 3 percent annual increases thereafter. The legislation also:

- Reinstates the position of U.S. Fire Administrator as a Presidentially-appointed, Senate-confirmed position (this was unintentionally eliminated by the Homeland Security Act of 2002 by a broader provision modifying the status of executive positions transferred into the department).
- Requires the Administrator to develop and implement a strategy for promoting the installation and use of residential fire sprinklers.
- Transfers responsibility for administration of the Assistance to Firefighters Grant Program from the Director of FEMA to the USFA Administrator.

On June 19, 2003, the Senate Commerce Committee approved S. 1152, its version of the USFA Authorization legislation. S. 1152 authorizes USFA activities through FY 2008, and differs from H.R. 2692 primarily in its inclusion of provisions from S. 321, the Firefighting Research and Coordination Act. S. 321 and its companion in the House, H.R. 545, introduced by Representative Camp (MI), would (1) authorize the Administrator to develop standards for new firefighting technologies such as thermal imaging cameras and chemical protective equipment, and require that equipment purchased through the Assistance to Firefighters Grant Program meet

those standards; (2) require the Administrator to work with State and local fire service officials to establish nationwide and State mutual aid systems for responding to national emergencies; and (3) authorize the National Fire Academy to train firefighters to offer courses to respond to acts of terrorism. A complete section-by-section analysis of both H.R. 2692 and H.R. 545 are included in the appendix.

Council on Foreign Relations Report on Emergency Response Needs

On June 29, 2003, the Council on Foreign Relations, a foreign affairs think tank, released a report entitled, *Emergency Responders: Drastically Underfunded, Dangerously Unprepared*. The report was compiled by an Independent Task Force on Emergency Responders led by former Senator Warren Rudman and former White House cyber-security chief Richard Clarke. The task force met with emergency responder organizations across the country to identify needs—not a wish list—for minimum effective response to a catastrophic terrorist attack. The final unbudgeted needs of emergency responders was determined by the task force to be \$98.4 billion, including almost \$37 billion for the fire services. The report does not make clear how the task force arrived at this figure and how the \$37 billion estimated need for the fire services is broken down according to equipment, personnel, training, etc.

6. QUESTIONS FOR WITNESSES

In addition to being asked to provide written comment on H.R. 2692, witnesses were asked the following questions:

Questions for Administrator Paulison

- What is the Administration's position on the provisions of H.R. 545, the Firefighting Research and Coordination Act (enclosed)? What is the current process for developing standards for new firefighting technologies, and how does USFA contribute to this effort?
- What is the status of traditional USFA activities such as public education and outreach, fire research and data analysis, and National Fire Academy training programs? What is the status of the USFA Assistance to Firefighters Grant Program?
- What is the status of USFA-supported fire research programs? Please provide a list of these activities, including budget information. How do you work to leverage USFA's relatively small research budget with related efforts at the Department of Homeland Security, National Institute of Standards and Technology, other federal agencies, and the private sector?
- How have USFA activities been affected by its recent transition into the Emergency Preparedness and Response Directorate of the Department of Homeland Security?
- Please comment on the recently released report by the Council on Foreign Relations, *Emergency Responders: Drastically Underfunded, Dangerously Unprepared*. Are the findings and recommendations, which call for an additional \$36 billion annually for the fire services, realistic?

Questions for Dr. Bement

- Provide an overview of fire research activities at the National Institute of Standards and Technology (NIST), including budget details. With regard to mission and focus, how do NIST fire research activities compare to those at USFA? How does NIST coordinate and prioritize these activities with USFA?
- What is the current process for developing standards for new firefighting technologies, and how is NIST involved in this effort? What challenges exist associated with standardization of firefighting equipment and technologies? Has the absence of standards in any particular areas acted as a barrier to the introduction of new firefighting technologies?

Questions for Mr. Hall

- What is the NFPA position on H.R. 545, the Firefighting Research and Coordination Act (enclosed)? What is the current process for developing standards for new firefighting technologies, and how is NFPA involved in this effort? What challenges exist associated with standardization of firefighting equipment and technologies? Has the absence of standards in any particular areas acted as a barrier to the introduction of new firefighting technologies?
- Provide an overview of the findings of the recent FEMA/NFPA study, “*A Needs Assessment of the U.S. Fire Service.*” How can Congress use the findings to strengthen USFA in the pending reauthorization legislation?
- Please comment on the findings and recommendations of recently released report by the Council on Foreign Relations, *Emergency Responders: Drastically Underfunded, Dangerously Unprepared.* How did NFPA contribute to this study?

Questions for Mr. Compton

- What is the fire services community’s opinion of provisions in the enclosed legislation, H.R. 545, the Firefighting Research and Coordination Act?
- Is the Assistance to Firefighters Grant Program successfully meeting its charge to help the Nation’s fire departments meet basic firefighting equipment and training needs necessary for day-to-day operations? Should the program be modified in this reauthorization legislation, and if so, how?
- What is the fire services community’s general opinion on the proposed consolidation of the Assistance to Firefighters Grant Program with other first responder grant programs within DHS, including the recent proposal to move the program into the DHS Office of State and Local Government Coordination? What other encouragements and concerns does the fire services community have associated with the recent transition of FEMA and USFA into the Emergency Preparedness and Response Directorate of the Department of Homeland Security?

- How effective has USFA been at administering “traditional” agency activities such as public education, outreach, and research, and data collection and analysis? Please provide any recommendations for improving these activities within USFA.
- Please comment on the recently released report by the Council on Foreign Relations, *Emergency Responders: Drastically Underfunded, Dangerously Unprepared*. Are the findings and recommendations, which call for an additional \$36 billion annually for the fire services, realistic?

7. APPENDIX I

Section by Section Analysis of H.R. 2692

Introduced by Mr. Smith of Michigan and Ms. Johnson of Texas

Section 1. Short Title.

“United States Fire Administration Authorization Act of 2003”.

Section 2. United States Fire Administrator.

Preserves the position of U.S. Fire Administrator as a Presidentially-appointed, Senate-confirmed position.

Section 3. National Residential Fire Sprinkler Strategy.

Requires the Administrator to develop and implement a strategy for promoting the installation and use of residential fire sprinklers. Requires strategy to include advocacy and informational support to relevant stakeholders, with a particular focus on residences at high risk to fire hazards and occupants at high risk to fire hazards (such as senior citizens).

Section 4. Support for Training to Fight Maritime Fires.

Amends the Assistance to Firefighters Grant Program to allow support for training to fight maritime fires as an eligible grant activity.

Section 5. Firefighters Assistance Grants Program.

Transfers responsibility for administration of the program from the Director of the Federal Emergency Management Agency (FEMA) to the Administrator of the U.S. Fire Administration (USFA).

Section 6. Authorization of Appropriations.

Authorizes appropriations for USFA of \$61.0, \$62.83, and \$65 million annually for fiscal years FY 2004 through FY 2006, respectively.

Section 7. Courses and Training Assistance.

Clarifies that National Fire Academy Superintendent, in offering training courses, work to accommodate as many geographic areas and needs of firefighters as possible.

8. APPENDIX II

Section-by-Section Analysis of H.R. 545

Introduced by Mr. Camp of Michigan

Section 1. Short title.

“Firefighting Research and Coordination Act.”

Sec. 2. New firefighting technology.

Subsection (a) would establish a new section 8(e) of the Federal Fire Prevention and Control Act of 1974 (15 U.S.C. 2207). This new subsection would direct the Administrator, in consultation with the National Institute of Standards and Technology, the Inter-Agency Board for Equipment Standardization and Inter-Operability, national voluntary consensus standards development organizations, and other interested parties, to develop new, and utilize existing, measurement techniques and testing methodologies for evaluating the performance of new firefighting technology, including:

- personal protection equipment;
- devices for advance warning of extreme hazard;
- equipment for enhanced vision;
- devices to locate victims, firefighters, and other rescue personnel in above-ground and below-ground structures;
- equipment and methods to provide information for incident command, including the monitoring and reporting of individual personnel welfare;
- equipment and methods for training, especially for virtual reality training; and
- robotics and other remote-controlled devices.

The Administrator would also be required to evaluate the compatibility of new equipment and technology with existing firefighter technology, and support the development of new voluntary consensus standards through national voluntary consensus standards organizations for new firefighting technologies.

For equipment for which applicable voluntary consensus standards have been established, the Administrator would be directed to require, by regulation, that equipment purchased through the Assistance to Firefighters Grant Program established by section 33 of the Federal Fire Prevention and Control Act of 1974 (15 U.S.C. 2229) meet or exceed applicable voluntary consensus standards. For the purposes of this subsection, the Administrator would have the discretion to determine the applicability of voluntary consensus standards to an application under this program.

Authorizes appropriations of \$2.2 million for FY 2004 to carry out this section.

Sec. 3. Coordination of response to national emergency.

Subsection (a) would create a new section 10(b) of the Federal Fire Prevention and Control Act of 1974 (15 U.S.C. 2209). New subsection (b) would require the Administrator, after consultation with the Director of FEMA, to provide technical assistance and training to State and local fire service officials to establish nationwide and State mutual aid systems for dealing with national emergencies. These mutual aid systems would include threat assessment and equipment deployment strategies, and include means of collecting asset and resource information to provide accurate and timely data for regional deployment. These mutual aid systems also would have to be consistent with FEMA’s Federal Response Plan. The Administrator, in consultation with the

Director of FEMA, would be required to develop and make available to State and local fire service officials model mutual aid plans for both intrastate and interstate assistance.

Subsection (b) would require the Administrator to report to the Senate Committee on Commerce, Science, and Transportation and the House of Representatives Committee on Science, within 90 days after the date of enactment of this Act, on the need for a strategy concerning the deployment of volunteers and emergency response personnel (as defined in section 6 of the Firefighters' Safety Study Act (15 U.S.C. 2223e)), including a national credentialing system, in the event of a national emergency.

Subsection (c) would require the Director of FEMA to revise the Federal Response Plan within 180 days after the date of enactment of this Act to incorporate plans for responding to terrorist attacks, particularly in urban areas, including fire detection and suppression and related emergency services. The Director of FEMA would also be required to transmit a report to the Senate Committee on Commerce, Science, and Transportation and the House of Representatives Committee on Science on these revisions.

Sec. 4. Training.

Subsection (a) would amend section 8(d)(1) of the Federal Fire Prevention and Control Act of 1974 (15 U.S.C. 2206(d)(1)) to authorize the Superintendent of the National Fire Academy to conduct training in the following areas:

- (i) strategies for building collapse rescue;
- (ii) the use of technology in response to fires, including terrorist incidents and other national emergencies;
- (iii) response, tactics, and strategies for dealing with terrorist- caused national catastrophes;
- (iv) use of and familiarity with FEMA's Federal Response Plan;
- (v) leadership and strategic skills, including integrated management systems operations and integrated response;
- (vi) applying new technology and developing strategies and tactics for fighting forest fires;
- (vii) integrating terrorism response agencies into the national terrorism incident response system; and
- (viii) response tactics and strategies for fighting fires at United States ports, including fires on the water and aboard vessels.

Subsection (b) would authorize the Superintendent of the National Fire Academy to consult with other Federal, State, and local government officials in developing curricula for classes at the Academy.

Subsection (c) would require the Administrator to coordinate the training provided under section 8(d)(1) of the Federal Fire Prevention and Control Act of 1974 (15 U.S.C. 2206(d)(1)) with the Attorney General, the Secretary of Health and Human Services, and the heads of other Federal agencies, to ensure that such training does not duplicate existing courses available to fire service personnel and to establish a mechanism for eliminating duplicative training programs.